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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/725,709	12/02/2003	Keith Eric Neuendorff	CIS0015C1US	4737

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EXAMINER

LEVITAN, DMITRY

ART UNIT	PAPER NUMBER
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2616

NOTIFICATION DATE	DELIVERY MODE
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10/31/2007

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary	Application No. 10/725,709	Applicant(s) NEUENDORFF ET AL.	
	Examiner Dmitry Levitan	Art Unit 2616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 09 October 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 18-47 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 18-47 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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Amendment, filed 10/09/07, has been entered. Claims 18-47 remain pending.

Claim Rejections - 35 USC § 112

1. In light of Applicant's amendment the rejection of claims 18-47 under 35 U.S.C. 112, second paragraph, set in the previous Office action, has been withdrawn.
2. Claims 18-47 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 18, 30, 40 and 44 limitations, directed to "dynamically generate" and "dynamically identifying" are unclear, because it is not understood what "dynamically" means in the context of the claims.

According the Remarks on page 14, the meaning of "dynamically" was compared with the user selection steps of the previous art. This comparison is unclear, as the Application itself comprises user's actions in OUTLINE on page 15:25-26, 16:29-30, etc.

Therefore, it is unclear what steps are considered "dynamically generating/identifying" and what criteria identify steps, which are not complying with these limitations.

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are

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such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 18-22, 28-32, 38-42 and 44-46 are rejected (as best understood) under 35 U.S.C. 103(a) as being unpatentable over Uphadya (US 5,949,755) in view of Holland (US 5,987,026).

3. Regarding claims 18-20, 30, 40 and 44, Uphadya substantially teaches a method, a network node, an apparatus and program comprising executing one or more tasks within each of plurality of nodes of a network (A, B, C and D nodes, interconnected in a SONET ring network, as shown on Fig. 1 and 6, disclosed on 5:33-6:60) to dynamically generate:

first data identifying at least one node of said plurality of nodes at which insert data is added, wherein said insert data is associated with said each of said plurality of nodes; and drop data is deleted, wherein said drop data associated with each of said plurality of nodes (each node generates a connection table, identifying source and destination nodes, wherein data of VC 100 and 200 is inserted/added and wherein data of VC 100 and 200 is dropped/deleted, as shown on Fig. 6 and 5:34-57, wherein VC 100 and 200 are only examples of the multiple VCs, as each node of the network comprises a connection table, identifying all add and drop nodes of the network 2:1-49), and

second data indicating in-transit data being transmitted over said network (each node generates Transport Identifier (TID) data indicating pass thru condition of the in-transit data, as shown on Fig. 1-3 and 3:25-67);

dynamically identifying a destination node of said in-transit data (connection tables identify destination node for in-transit data, as shown on Fig. 6 and 5:34-52); and

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transmitting said in-transit data to said destination node using said first data and said second data (transmitting VC 100 and VC 200 through the nodes, as shown on Fig. 6, utilizing connection tables and SONET protocol).

In addition, regarding claims 30, 40 and 44, Uphadya teaches CPU 200 and memories/storage 210, 320 and 325, as shown on Fig. 7 and 6:21-27, to perform the operation as described above.

In addition, regarding claim 40, Uphadya inherently teaches a node interface to connect the node to the ring network, as shown on Fig. 1, because a node interface is essential for the system/ring operation and CPU 200 as a timing communication processor, as the node performs insertion/drop of asynchronous ATM cells into synchronous SONET links.

Uphadya does not teach second data indicating format of the in-transit data.

Holland teaches indicating format of the in-transit data by using a label in the data header to indicate synchronous or asynchronous format of the in-transit data, as described on 1:40-2:6 and Table 1.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to add indicating format of the in-transit data of Holland to the system of Uphadya to improve the system design by simplifying the processing of the data by separating it into synchronous and asynchronous, as disclosed on 1:9-32 of Holland.

4. Regarding claims 21, 22, 31, 32, 41, 42, 45 and 46, Uphadya teaches insert and drop data as the data transmitted from other nodes of the ring network and received by the node of the ring,

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as shown on Fig. 6, as requested by nodes CPUs, which are operating the transmission of the data in the ring network..

5. Regarding claims 28, 29, 38, 39, Uphadya teaches to detect a failure on the ring link and perform in-transit data switch from the failed link to a protection link (identifying link failure and switching traffic to the protection link as shown on Fig. 10 and 11, and disclosed on 6:60-7:55, wherein the switch maps have been established before the failure).

6. Claims 25-27 and 35-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Uphadya in view of Holland in further view of Taniguchi (US 6,122,250) and Black (TCP/IP and related protocols, McGraw-Hill, 1998, pages 1, 2 and 166-169).

Uphadya in view of Holland substantially teaches the limitations of claims (see claims 18-20, 30 and 31 rejections above), including rings, as shown on Fig. 1 and using protection in a case of a link failure, as shown on Fig. 10 and 11.

Uphadya in view of Holland does not teach using squelch operation and utilizing TCP retransmission feature.

Taniguchi teaches using squelch operation to avoid misconnection of the failed ring in case of failure (Abstract).

Black teaches dividing data in segments and retransmitting it according to the predefined intervals utilized in TCP timers, as basic TCP features on pages 167-169.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to add using squelch operation to avoid misconnection of the failed ring of Taniguchi and dividing data in segments and retransmitting it according to the predefined intervals of Black

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to the system of Uphadya in view of Holland, utilizing a more efficient protection method of Taniguchi, which eliminates need for an additional protection ring, and to improve the system handling the ring failure to avoid misconnections and utilizing TCP features to improve reliability of the communications on the network.

Allowable Subject Matter

3. Claims 23, 24, 33, 34, 43 and 47 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

Response to Arguments

7. Applicant's arguments with respect to claims limitations, directed to second data have been considered but are moot in view of the new ground(s) of rejection.

On pages 12-14 of the Response, Applicant argues that Uphadya does not teach generation of first data.

Examiner respectfully disagrees.

Uphadya clearly teaches each of the nodes of the ring to create a first data as a connection table identifying the connections on the ring, where data is inserted or dropped, as VC connections on Fig. 6 are only examples of the network disclosed on 2:1-37. The connection table of Uphadya provisions all the connections of the ring and is identical to the claimed first data.

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User selection of the nodes connections is essential to any ring system, as without knowing what nodes to connect it is impossible to set up/provision the ring. Current application is not an exception of the user's intervention, as the Addendum A on page 15, disclosing the operation of the system of the Application, starts with user providing provisional information.

On page 17 of the Response, Applicant argues that Taniguchi does not teach switching and squelching traffic.

Examiner respectfully disagrees.

Taniguchi clearly teaching switching traffic and performing squelch operation, including creating of a squelch table for a ring system, as disclosed on 1:5-46.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dmitry Levitan whose telephone number is (571) 272-3093. The examiner can normally be reached on 8:30 to 4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lynn Feild can be reached on (571) 272-2092. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Handwritten signature of Dmitry Levitan, consisting of stylized initials 'DL' followed by a full signature.

Dmitry Levitan
Primary Examiner
Art Unit 2616

**DMITRY LEVITAN
PRIMARY EXAMINER**